

作业 #9

1. Write a program to show the content of file `d:\words.txt` and count the occurrence frequencies of letters, digits and other characters in the file.

[sample]

```
A man can be destroyed but not defeated. Love means never having to say you're sorry.
Life was like a box of chocolates, you never know what you're gonna get. Death is just
a part of life, something we're all destined to do. I'm only brave when I have to be.
Being brave doesn't mean you go looking for trouble. We become the most familiar stra
ngers. Everything that has a begin has an end. Frankly, my dear, I don't give a damn.
You're throwing away happiness with both hands, and reaching out for something that wi
ll never make you happy. The truth is out there. Death smiles at us all. All a man can
do is smiles back. You can't change the past. Stupid is as stupid does. I am someone e
lse when I'm with you, someone more like myself. If you are ever in trouble, don't try
to be brave, just run, just run away. The things you own, end up owing you. Get busy
living or get busy dying. Keep your friends close and your enemies closer. Hope can se
t you free. It doesn't matter if the guy is perfect or the girl is perfect, as long as
they are perfect for each other. I think it's hard winning a war with words. Sometime
s people think they lose things and they didn't really lose them. It just gets moved.
You had me at hello. With great power there must come great responsibility.#1234567890
##1234567890##1234567890##1234567890##1234567890#

letters: 986
digits: 50
others: 304
```

2. File `d:\scores.txt` containing 120 integers, write a program to sort them in descending order. Your program must define and call two functions `sort()` and `print_a()`, the function `sort()` is employed to sort, and the other is used to output your results.

[sample]

```
Before sorting ...
72 39 52 93 89 43 84 80 35 79 64 77 73 79 49 71 40 44 53 60 30 68 50 75 85 92 70 59 43 44
68 49 42 70 41 90 63 87 65 61 83 91 83 57 94 58 82 38 71 50 37 99 42 50 95 64 52 73 41 49
32 58 67 76 50 48 44 85 97 45 47 63 32 64 81 39 65 84 47 30 39 52 43 78 54 33 71 56 64 61
99 38 83 42 69 50 74 34 65 61 33 53 72 61 50 75 46 38 99 79 93 70 95 93 51 50 80 83 72 79

After sorting ...
99 99 99 97 95 95 94 93 93 93 92 91 90 89 87 85 85 84 84 83 83 83 83 82 81 80 80 79 79 79
79 78 77 76 75 75 74 73 73 72 72 72 71 71 71 70 70 70 69 68 68 67 65 65 65 64 64 64 64 63
63 61 61 61 61 60 59 58 58 57 56 54 53 53 52 52 52 51 50 50 50 50 50 50 49 49 49 48 47
47 46 45 44 44 44 43 43 43 42 42 42 41 41 40 39 39 38 38 38 37 35 34 33 33 32 32 30 30
```

3. File `d:\dates.txt` contains many dates (format: yyyy-mm-dd, one date per line). Read in each date, check whether the date is legal or not, and output all the illegal dates to another file `d:\illegaldates.txt` (one date per line). Your program must define and call a function that can determine whether a date is legal or not.

[sample]

